

Issue Date: 09-25-2019
Revision Date: 09-24-2024
Renewal Date: 09-30-2025

DIVISION: 06 00 00 – WOOD, PLASTICS, AND COMPOSITES
Section: 06 16 36 – Wood Panel Product Sheathing

DIVISION: 07 00 00 – THERMAL AND MOISTURE PROTECTION
Section: 07 25 00 – Weather Barriers
Section: 07 27 00 – Air Barriers

REPORT HOLDER:
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REPORT SUBJECT:
LP WeatherLogic® Air & Water Barrier

1.0 SCOPE OF EVALUATION

1.1 This Research Report addresses compliance with the following Codes:

- 2024 and 2021 *International Building Code®* (IBC)
- 2024 and 2021 *International Residential Code®* (IRC)
- 2024 and 2021 *International Energy Conservation Code®* (IECC)
- 2023 and 2021 *Oregon Residential Specialty Code (ORSC)*, Section R703.1.1 (See Section 9)
- 2023 and 2020 *Florida Building Code* (excluding HVHZ) (See Section 9)

NOTE: This report references the most recent Code editions noted. Section numbers in earlier editions may differ.

1.2 LP WeatherLogic® Air & Water Barrier has been evaluated for the following properties (see Table 1):

- Physical Properties
- Water Resistance
- Air Permeance
- Drainage Efficiency
- Roof Fire Classification

1.3 LP WeatherLogic® Air & Water Barrier has been evaluated for the following uses (see Table 1):

- Use as an air barrier
- Use as a water-resistive barrier
- Use as a roof underlayment
- Use in classified roof assemblies
- Use in nonclassified roof assemblies
- Use in Type V construction under the IBC and in one- and two-family dwellings under the IRC

2.0 STATEMENT OF COMPLIANCE

LP WeatherLogic® Air & Water Barrier complies with the Codes listed in Section 1.1, for the properties stated in Section 1.2 and uses stated in Section 1.3, when installed as described in this report, including the Conditions of Use stated in Section 6.

2.1 2024 IBC and IRC Evaluation Reports

The Intertek CCRR is an *Evaluation Report* for approval of an alternate material, design, or method of construction in accordance with Section 104.2.3.6.1 of the 2024 IBC and Section R104.2.2.6.1 of the 2024 IRC.

3.0 DESCRIPTION

3.1 LP WeatherLogic® Panel: The LP WeatherLogic® Panel consists of a 7/16 to 5/8 Performance Category Oriented Strand Board (OSB) panel adhered with a factory-applied proprietary overlay. The Structural 1, Exposure 1 OSB complies with US DOC PS 2 for wood structural panels with a span rating of 24/16, 32/16, or 40/20.

3.2 LP WeatherLogic® Seam & Flashing Tape: The LP WeatherLogic® Seam & Flashing Tape is a pressure-sensitive, coated polymeric film that is supplied in either 3-3/4- or 6-inch widths. The tape is used for sealing panel joints and to flash penetrations, openings, and material transitions. The tape is listed in the AAMA Verified Component List as complying with AAMA 711 Type A, Level 3.



3.3 LP WeatherLogic® Seam & Flashing Sealant: The LP WeatherLogic® Seam & Flashing Sealant is a liquid-applied sealant that is supplied in tubes to seal panel joints and to flash penetrations, openings, and material transitions. The sealant shall be installed a minimum of 15 wet mils thick and sufficiently wide to extend a minimum of 1-3/4 inches on each side of seams and 1-1/4 inches beyond nail heads. The sealant is listed in the AAMA Verified Component List as complying with AAMA 714 Level 3, Category I.

4.0 PERFORMANCE CHARACTERISTICS

4.1 Water Vapor Transmission: The water vapor transmission (WVT) rate of the proprietary overlay is 36.1 g/(24-hr-m²) when evaluated in accordance with ASTM E96 Procedure B and 8.84 g/(24-hr-m²) when evaluated in accordance with ASTM E96 Procedure A (desiccant method). The vapor permeance of the proprietary overlay is 5.35 perms when evaluated in accordance with ASTM E96 Procedure B and 1.27 perms when evaluated in accordance with ASTM E96 Procedure A.

4.2 Air Barrier Assembly: When used as an air barrier, the LP WeatherLogic® Air & Water Barrier system must be installed in accordance with the manufacturer's instructions and Section 5 of this report. When tested in accordance with ASTM E2357, the LP WeatherLogic® Air & Water Barrier system exhibits a maximum air leakage rate less than 0.04 cfm/ft² (0.2 L/s-m²) at a pressure differential of 1.57 pounds per square foot (75 Pa).

4.3 Drainage Efficiency: The LP WeatherLogic® Air & Water Barrier exhibits a drainage efficiency of greater than 75% when evaluated in accordance with ASTM E2273 on assemblies containing both vertical and horizontal seams.

4.4 Surface Burning Characteristics: The LP WeatherLogic® Panel has a flame-spread index of 200 or less and a smoke-developed index of 450 or less, when tested in accordance with ASTM E84.

4.5 Wind Uplift Resistance: When used as roof sheathing, allowable wind uplift resistance values shall be determined for the LP WeatherLogic® Panel as permitted for wood structural panel sheathing in Sections 1609 and 2304.8.2 of the IBC and Section R301.2.1 of the IRC.

4.6 Use in Shear Walls and Roof Diaphragms: LP WeatherLogic® Panels used in shear walls and roof diaphragms shall be designed in accordance with Section 2305 of the IBC and the American Wood Council *Special Design Provisions for Wind and Seismic* (AWC SDPWS). Panels used as wall bracing shall be installed in accordance with the provisions of IRC Section R602.

4.7 Fire Classification:

4.7.1 Class B: Where minimum 7/16-inch-thick LP WeatherLogic® Air & Water Barrier is installed with Class A asphalt shingles, the roofing assembly has a Class B roof fire classification.

4.7.2 Class A: Where minimum 15/32-inch-thick LP WeatherLogic® Air & Water Barrier marked with APA Mill 520 is installed with Class A asphalt shingles, the roofing assembly has a Class A roof fire classification.

4.7.3 Nonclassified Roofing: The LP WeatherLogic® Air & Water Barrier may be used as a component of nonclassified roof assemblies, where permitted by the code, when covered with any approved roof covering allowed by the manufacturer's installation instructions and the applicable code.

5.0 INSTALLATION

5.1 General: LP WeatherLogic® Air & Water Barrier must be installed in accordance with the manufacturer's published installation instructions, the applicable Code, and this Research Report. A copy of the manufacturer's instructions (LP WeatherLogic® Air & Water Barrier Installation Manual, Document LPWRB0094, revised December 2023) must be available on the jobsite during installation.

5.2 Application: The LP WeatherLogic® Panels must be attached to structural framing in accordance with the applicable code for wood structural panels, and in compliance with their span rating. The panels must be installed with the overlay facing outwards. Panels may be installed horizontally or vertically on walls. Panels must be installed perpendicular to supports and with two or more continuous spans on roofs. Roof panels must be installed at a minimum slope of 2:12. A 1/8-inch gap is required between panels. All panel joints must be sealed with either LP WeatherLogic® Seam & Flashing Tape or LP



WeatherLogic® Seam & Flashing Sealant. The panel surface must be dry and free from debris or foreign substances prior to tape or sealant installation.

5.3 Flashing: All penetrations and terminations of exterior wall assemblies must be flashed in accordance with the applicable code. LP WeatherLogic® Seam & Flashing Tape or LP WeatherLogic® Seam & Flashing Sealant may be used to seal joints and overlap flashings and accessories as shown in the standard details of the LP WeatherLogic® Air & Water Barrier Installation Manual.

5.4 Use Behind Exterior Cement Plaster (Stucco): When installed behind exterior cement plaster (stucco) in accordance with IBC Section 2510.6 or IRC Section R703.7.3, the LP WeatherLogic Air & Water Barrier system serves as the first layer equivalent to 10-minute Grade D paper. In Dry (B) climate zones, the installation shall comply with Item 1 of IBC Section 2510.6.1 or IRC Section R703.7.3.1, as applicable. In Moist (A) or Marine (C) climate zones, the installation shall comply with Item 1 of IBC Section 2510.6.2 or IRC Section R703.7.3.2, as applicable.

6.0 CONDITIONS OF USE

6.1 Installation must comply with this Research Report, the manufacturer's published installation instructions, and the applicable Code. In the event of a conflict, this report governs.

6.2 The LP WeatherLogic® Air & Water Barrier must be covered by a code-complying exterior wall or roof covering within the time period specified by the manufacturer.

6.3 Fire-resistance-rated construction is outside the scope of this report.

6.4 The LP WeatherLogic® Panel is manufactured under a quality control program with inspections by Intertek Testing Services NA, Inc. and APA – The Engineered Wood Association (PS-2 and Florida Product Approval).

7.0 SUPPORTING EVIDENCE

7.1 Reports of tests in accordance with ASTM E84, ASTM E96, ASTM E2273, and ASTM E2357.

7.2 Data in accordance with the ICC-ES Acceptance Criteria for Water-resistive Membranes Factory-bonded to Wood-based Structural Sheathing, Used as Water-resistive Barriers (AC310), approved May 2008, editorially revised August 2015.

7.3 Data in accordance with ICC-ES Acceptance Criteria for Wood Structural Panel Roof Sheathing Factory-Laminated with an Alternative Roof Underlayment (AC266), approved May 2008, editorially revised October 2015.

7.4 Intertek Listing Report “Louisiana-Pacific – LP WeatherLogic Air & Water Barrier”, on the [Intertek Directory of Building Products](#).

8.0 IDENTIFICATION

The LP WeatherLogic® Panel is identified on the exterior face with the manufacturer's trademark and product name (LP WeatherLogic® Air & Water Barrier), a means of identifying the date of manufacture, the Intertek Mark as shown below, and the Code Compliance Research Report number (CCRR-0319). The interior face of the LP WeatherLogic® Panel bears the APA assigned plant number, the product thickness, and the span rating.



The LP WeatherLogic® Seam & Flashing Tape is identified with the manufacturer's trademark and product name (LP WeatherLogic® Air & Water Barrier), and the words “Seam & Flashing Tape”.

The LP WeatherLogic® Seam & Flashing Sealant is identified with the manufacturer's trademark and product name (LP WeatherLogic® Air & Water Barrier) and the words “Seam & Flashing Sealant”.

9.0 OTHER CODES

9.1 OREGON RESIDENTIAL SPECIALTY CODE

LP WeatherLogic® Air & Water Barrier, described in Sections 2.0 through 7.0 of this Research Report, complies with Section R703.1.1, Exception 1, of the *Oregon Residential Specialty Code*, for the editions indicated in





Section 1.1 of this report, for use without a separate drainage space when installed in accordance with the manufacturer's instructions and this Research Report.

9.2 FLORIDA BUILDING CODE

LP WeatherLogic® Air & Water Barrier, described in Sections 2.0 through 7.0 of this Research Report, complies with the *Florida Building Code – Building*, *Florida Building Code – Residential*, and *Florida Building Code – Energy Conservation*, for the editions indicated in Section 1.1 of this report, subject to the following conditions:

- LP WeatherLogic® Air & Water Barrier, when installed using LP WeatherLogic® Seam & Flashing Tape in accordance with the manufacturer's instructions and this Research Report, complies with Method 2 of Section 1507.1.1.1 of the *Florida Building Code – Building* and Section R905.1.1.1 of the *Florida Building Code – Residential* for use directly under asphalt shingles, metal panels or shingles, mineral surfaced roll roofing, slate and slate-type shingles, wood shakes, and wood shingles.
- Use of LP WeatherLogic® Air & Water Barrier for compliance with the High-Velocity Hurricane Zone provisions of the *Florida Building Code – Building* and the *Florida Building Code – Residential* has not been evaluated and is outside the scope of this Research Report.

Intertek is an approved *evaluation entity* and *quality assurance entity* pursuant to Florida Statute 553.842 – *Product Evaluation and Approval*.

10.0 CODE COMPLIANCE RESEARCH REPORT USE

10.1 Approval of building products and/or materials can only be granted by a building official having legal authority in the specific jurisdiction where approval is sought.

10.2 Code Compliance Research Reports shall not be used in any manner that implies an endorsement of the product by Intertek.

10.3 Reference to the <https://bpdirectory.intertek.com> is recommended to ascertain the current version and status of this report.

This Code Compliance Research Report ("Report") is for the exclusive use of Intertek's Client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this Report. Only the Client is authorized to permit copying or distribution of this Report and then only in its entirety, and the Client shall not use the Report in a misleading manner. Client further agrees and understands that reliance upon the Report is limited to the representations made therein. The Report is not an endorsement or recommendation for use of the subject and/or product described herein. This Report is not the Intertek Listing Report covering the subject product and utilized for Intertek Certification and this Report does not represent authorization for the use of any Intertek certification marks. Any use of the Intertek name or one of its marks for the sale or advertisement of the tested material, product or service must first be approved in writing by Intertek.





TABLE 1 – PROPERTIES EVALUATED

PROPERTY	APPLICABLE CODE SECTIONS ¹						
	IBC	IRC	IECC	ORSC	FBC – Building	FBC – Residential	FBC – Energy
Water-resistive Barrier	1403.2	R703.2	N/A	N/E ²	1404.2	R703.2	N/A
Air Barrier	1301	N/A	C402.6.1	N/E ²	1301	N/A	C402.5.1
Air Leakage	N/A	N/A	C402.6.2.3 R402.5	N/E ²	N/A	N/A	R402.4
Drainage Efficiency	N/A	N/A	N/A	R703.1.1 Exception 1	N/A	N/A	N/A
Underlayment	1507.1.1	R905.1.1	N/A	N/E ²	1507.1.1.1	R905.1.1.1	N/A
Roof Fire Classification	1505	R902	N/A	N/E ²	1505	R902	N/A

¹ Section numbers pertain to the most recent edition cited in Section 1.1 of this Report.

² N/E = Not Evaluated; Indicates a property that was outside the scope of this Report's evaluation of that Code.